THE OPTICAL LANTERN & CINEMATOGRAPH JOURNAL

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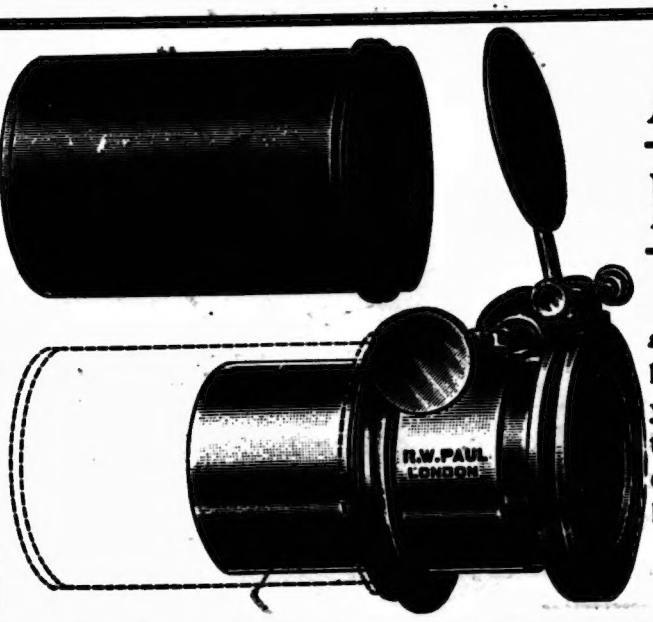
Incorporating "The Optical Magic Lantern Journal & Photographic Enlarger" "The Lantern World" and "Cinematograph Chronicle."

No. 2.—Vol. 2. DECEMBER, 1905. 2d. Monthly. By Post, 3/- per Ann.



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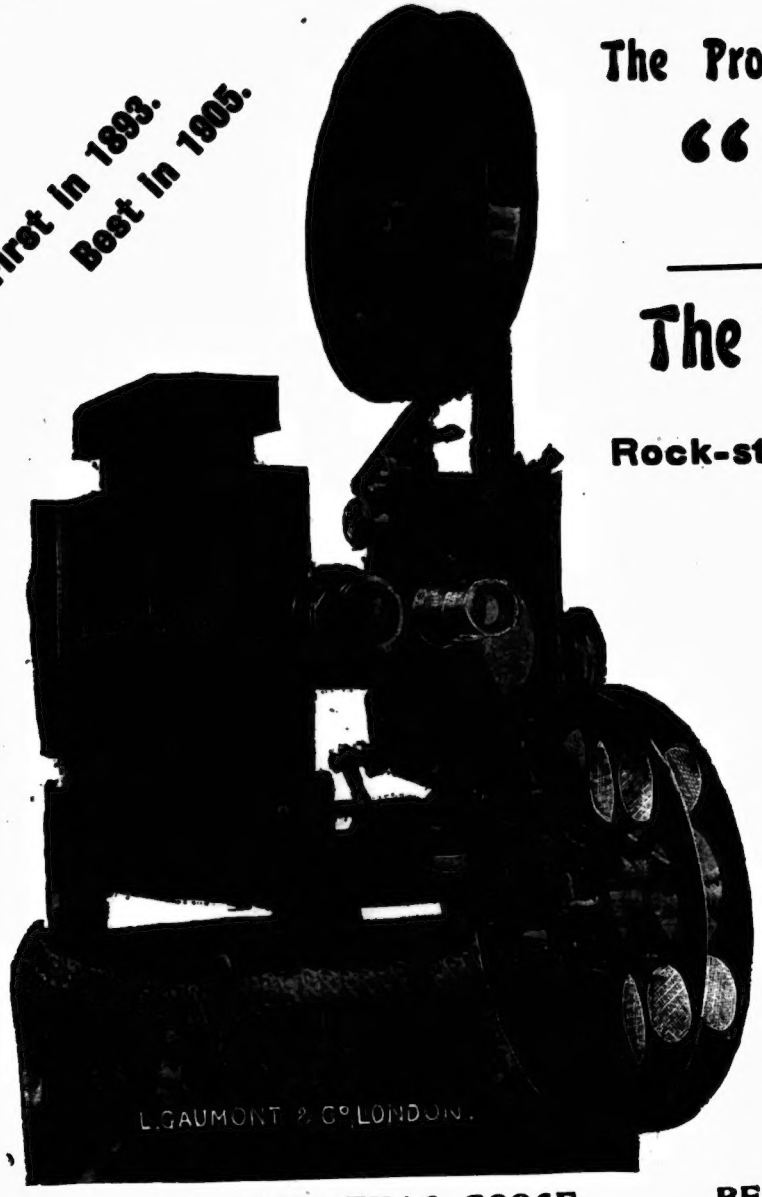

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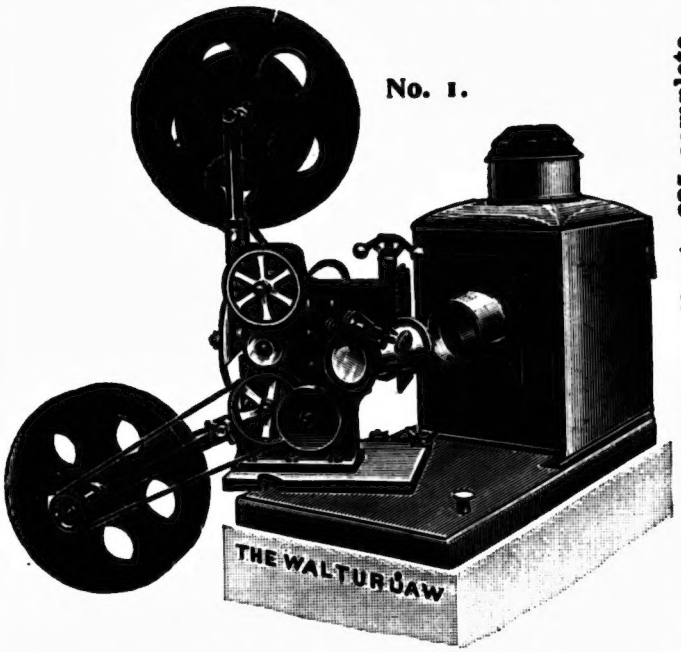

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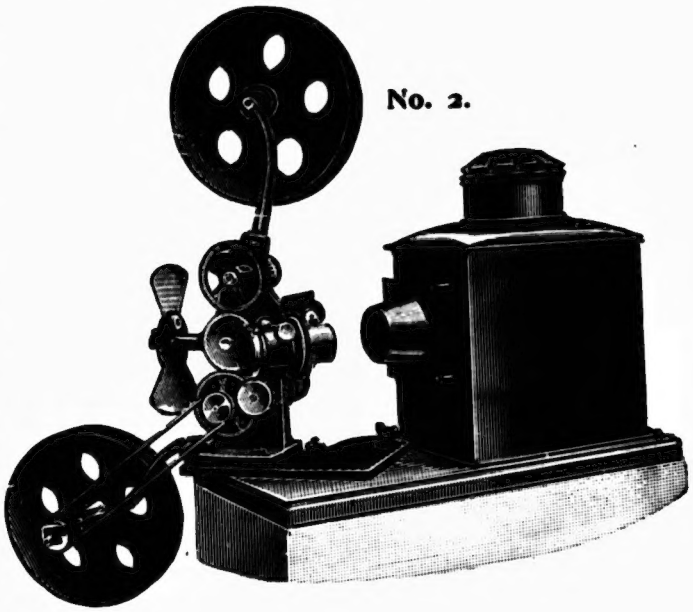

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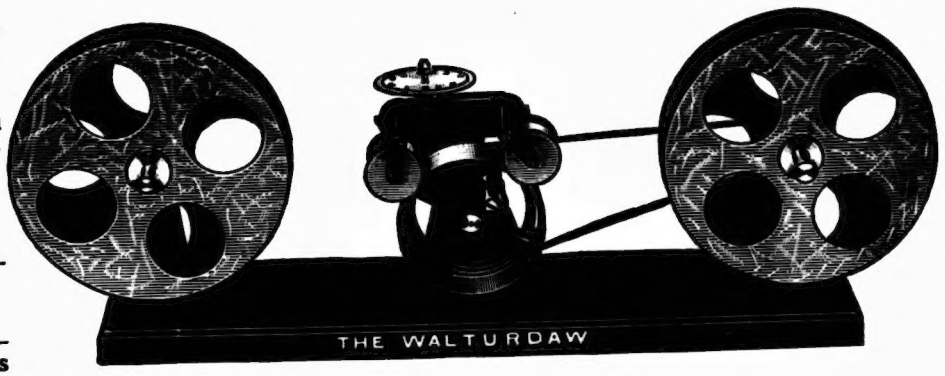

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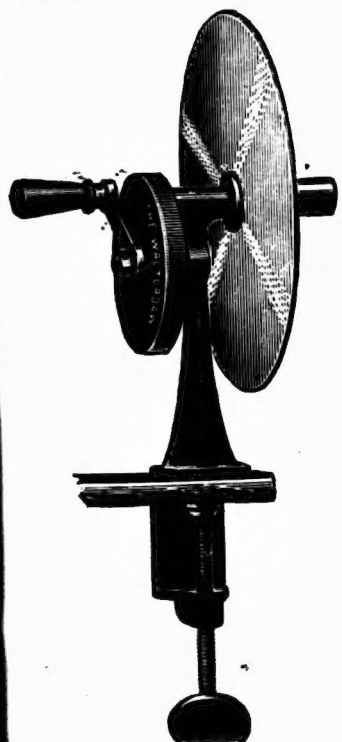

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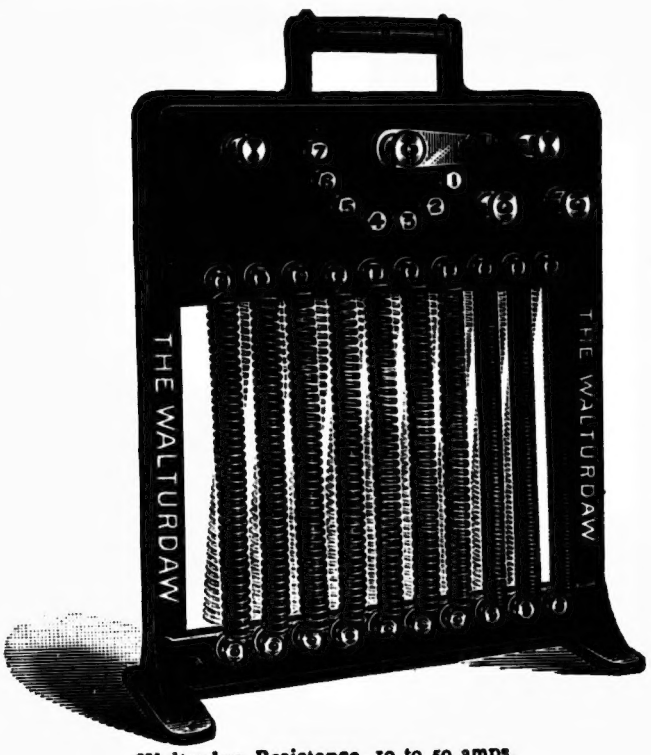

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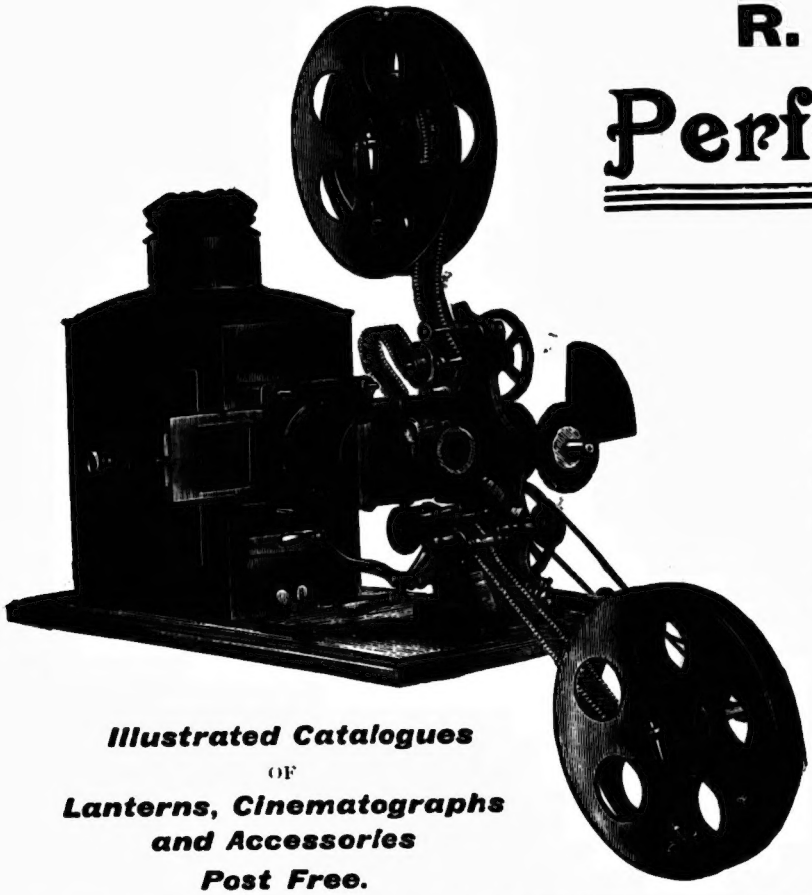

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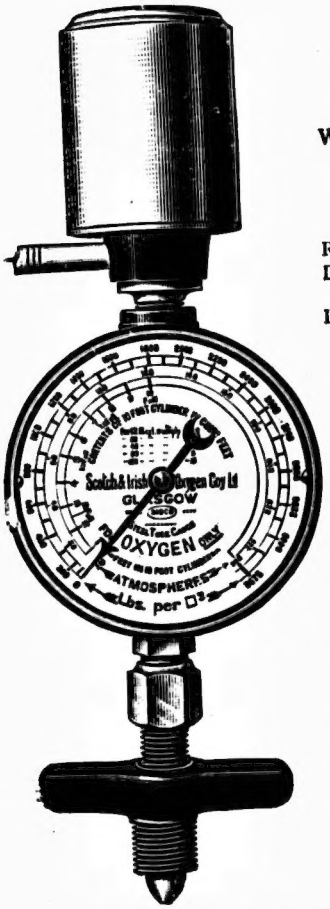

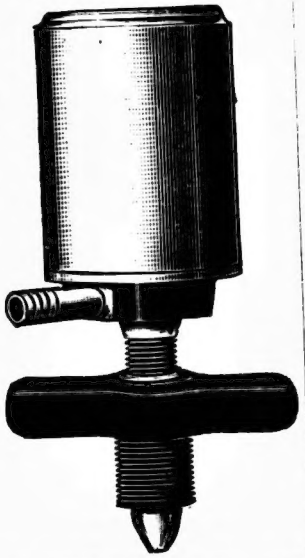

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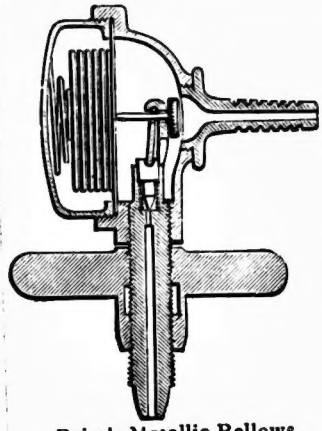

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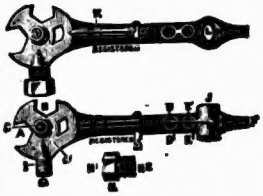

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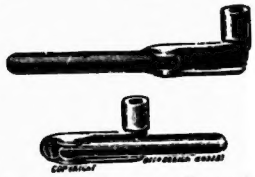
Folding Cylinder Stand for 4 in. Cyl. 4/-; 5½ in. 5/-; 7 in. 6/6



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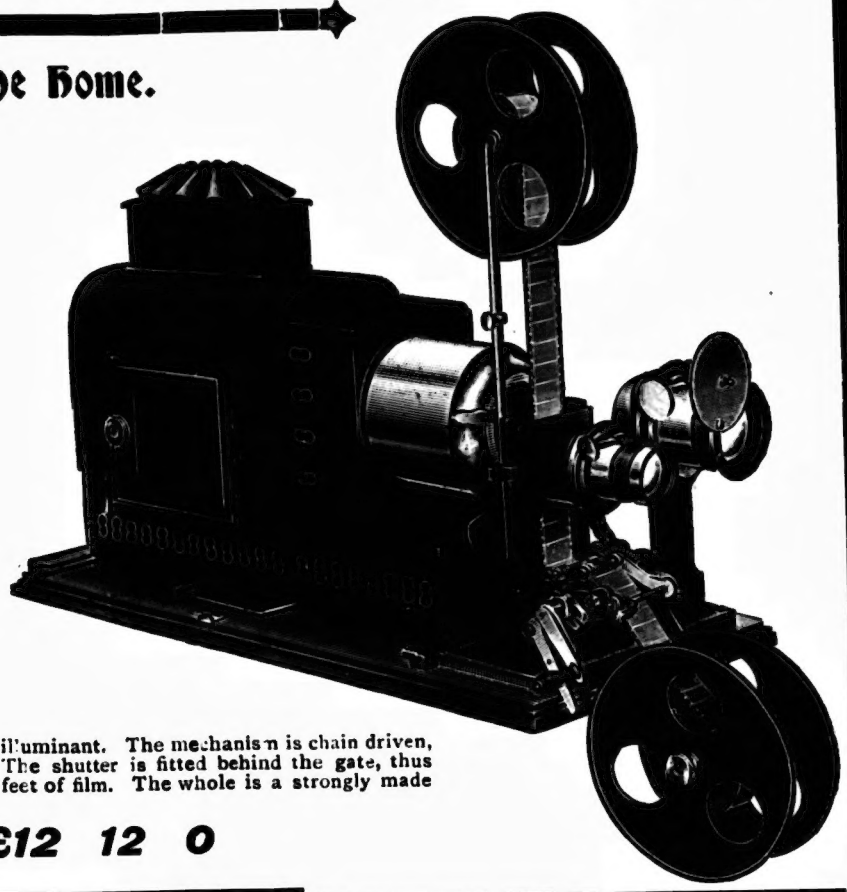

Mechanism—Standard Edison Gauge sprocket, Dog motion, with shutter and spring film stage, rewinding gear, and two spool reels, holding 400 feet of film.

Optics—A specially made double achromatic Petzval Combination, 2½-in. focus, in brass focussing jacket fitted to the cinematograph, and an 8-in. Double Achromatic Lens in rack and pinion mount with flashing shutter fitted for the lecture lantern, and 4 in. diameter plano-convex condenser.

Body—Russian iron, with side door with fibre handle and cowl, on well-finished mahogany base-board with sliding adjustment for the lantern body, centreing it alternately with the cinematograph and with the lantern fronts.

Case—Strong wood cabinet with strap handle.

Price complete, ***£5 5.***

The "GLOBE."

A very superior made machine, with extra large body for any illuminant. The mechanism is chain driven, with sprocket feed and pick-up, ensuring rock-steady pictures. The shutter is fitted behind the gate, thus reducing flicker to a minimum. Spools are provided to take 600 feet of film. The whole is a strongly made cabinet with iron-bound corners.

Price complete, ***£12 12 0***

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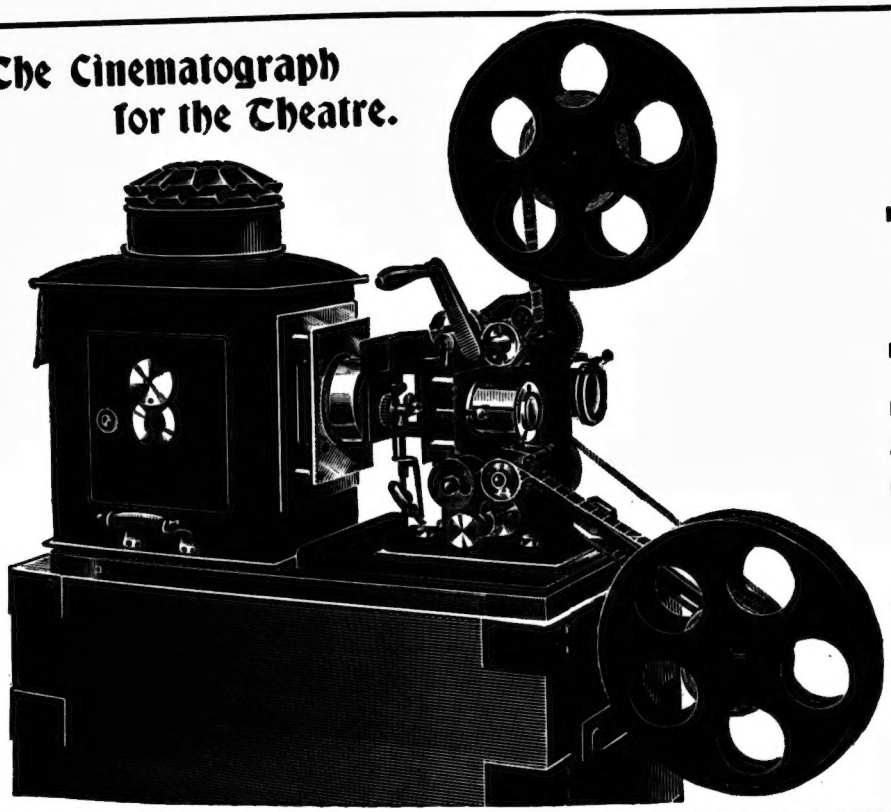

The "EMPIRE."

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Patents applied for.

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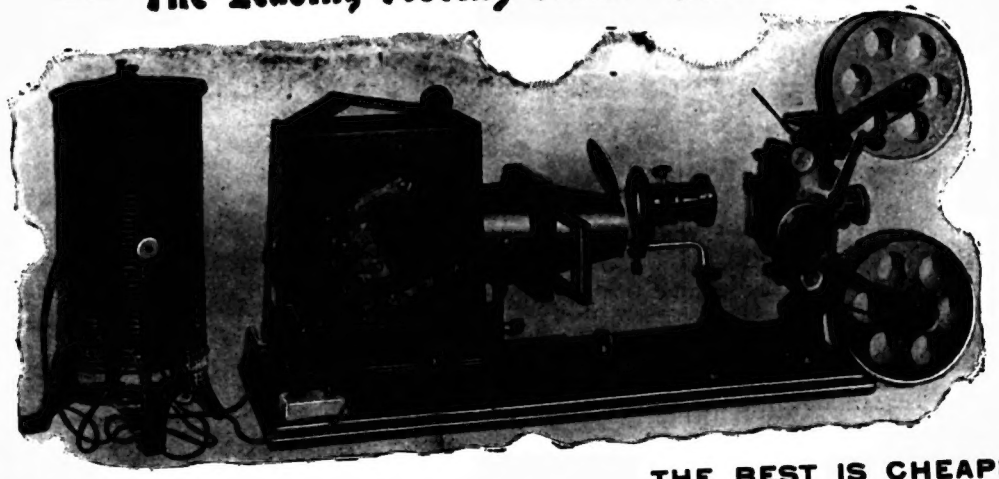

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Ordinary Position

THE trade of the month, if taken in all branches, has been up to the average of last year. Although nothing very startling has been put on the market, there has been a steady demand for lanterns, and we hear of one or two plums that have fallen to the English manufacturers, in competition with Continental houses. The supply of new subjects, in both slides and films, has been greater than the demand—every maker being quickly on the spot with topical events, in some cases ignoring quality in endeavouring to be first in the field.

✤

WHILE on the subject of trade, we wish emphatically to contradict a statement that has been reported from several quarters, to the effect that THE OPTICAL LANTERN AND CINEMATOGRAPH JOURNAL is financed by a certain firm in the trade. Such is entirely false, and we distinctly wish it understood that our magazine is neither owned, managed, or has the slightest connection with any firm in the trade, and that no one has a financial interest in its production, other than the firm who print and publish it. Our chief aim is to cater for the trade impartially; to assist operators, lecturers, and lantern users with advice from experts; to publish an organ for a profession whose various departments number thousands of mechanics, electricians, operators, artists, lecturers, engineers, photographers, and many others, who have shown by their support that they readily grasp the means we afford of making a common centre for so varying a range of industries.

✤

AN interesting chat we lately had with one of the most important firms of slide makers in London, determines us to give more space in future to matters dealing with this particular branch of the profession. Those who remember the *Optical Magic Lantern Journal*—whose successor we are—know how its pages again and again urged the adoption of the lantern as an educator and a science teacher. Very much has been done in this direction since those days, and the fact that our Progressive County Council, which has taken over the education of our children, has thought it necessary to furnish most of the leading schools with lantern apparatus, and has one of the finest collections of slides of educational subjects in the world, shows the importance of the matter.

We have found a certain pessimism and lack of enthusiasm among the manufacturers of slides which is far from helpful to the cultivation of increased business. The old slides, of the "Buy your own cherries" and "Nelly's dark days" order, must give place to modern titles of attractive character. The cinematograph showman is becoming aware that a set of good entertaining up-to-date slides breaks the monotony of a long series of moving pictures: how it relieves the strain of physical endurance which the eyes and brain are put to by the quick succession of events the films depict, and gives a fresh charm to the succeeding moving pictures. It is for the slide maker to step in and show he is alive to the needs of the present day. Fresh titles of current events are always needed, and will quickly find a market if advertised in the right direction, and we can see from the correspondence we receive that many a showman has difficulty in knowing to whom to apply for his special requirements.

We do not mind translating advertisements or letters from French and German correspondents, but we must draw the line at one we have just received in Russian. This, if made into a lantern slide and thrown on the screen would be an interesting study, but as a business communication it is apt to drive us to despair, and the literal interpretation by a Translation Bureau shows that technicalities are full of stumbling blocks to obtaining the clear meaning of the writer.

Very curious are some of the communications we receive. For instance, only this week we had a letter from a gentleman, who has just returned from Central Africa, with some full-size prints of intensely interesting subjects — wild animals, wild tribes and wild country—of peculiar interest and excellent subjects for some fine photos. Unfortunately, many of the negatives have been damaged beyond repair. Our friend has been asked to deliver lectures on his travels, and wishes to enhance their value by showing on the screen the pictures he has taken. He has written to ask us how slides can be manufactured from these prints, and we had a chat on the subject with one of Mr. E. G. Wood's managers, who informed us that slides are often prepared from photos and prints with excellent results. There is certainly a loss of detail apparent when compared with those made direct from negatives, but this is very slight and almost unappreciable, when the slide is made from a good bold print and the negative made with the aid of powerful arc lamps. He admits that the best prints for this purpose are the ordinary P.O.P. silver prints.

We recently had a visitor from Egypt, who is returning shortly and wishes to take with him an equipment for living pictures. His chief object in visiting us was to receive suggestions on the question of lighting. As far as we could understand, portability was one of the chief essentials, and naturally the Nernst Paul burner came to mind; but the fact that shows are to be given in out of the way corners, where the electric light has not yet reached, made this out of the question. Our enquirer was most anxious to get the fullest knowledge of the subject, and, if possible, a practical demonstration, so that he might be able to judge the respective values of lighting most suitable to his requirements. We pointed out to him last month's notice of the formation of a technical class for the study of the optical lantern, and he was full of regrets that such was not in existence that he might have the benefit of it during his six weeks stay in England. This is but one of the many instances we receive of the necessity for instruction in lantern work, and we trust early next year to find classes started where definite instruction can be obtained.

The recent decision of the Buxton Council to abandon the supply of electric current used for arc lights of cinematographs, because they interfered with the steadiness of the current supplied to small consumers, is worthy a touch of Dickens to convert it into a humourous illustration of the inflated importance of such autho-

rities. Surely their policy should be to increase their output and connections, so as to cater for all classes of consumer, and not cut off what should be one of the best paying channels for the distribution of their current. It places in a curious position the advertised exhibits whose source of supply is cut off, compared with the show given at the Town Hall, which, by virtue of an engagement with the authorities prior to their decision was unaffected by the restriction, and was consequently the only cinematograph show possible in Buxton under satisfactory conditions as to light. We believe the Sheffield Photo Company had the arrangements in hand, and were lucky to escape the ravages of Bumbledon.

✤

A CORRESPONDENT takes us to task for suggesting that films taken inside theatres are a novelty. He points out that, among others, the Urban Trading Co. took, without the aid of other than ordinary theatre lighting the Siegfried-Lurich Wrestling Match at the Alhambra, the Storm Scene from Mr. Beerbohm Tree's production "The Tempest" (photo'ed at His Majesty's Theatre last February), and scenes from the Entente Cordiale Ballet.

✤

OUR enquiry last month for films reproducing the late Sir Henry Irving, has, up to the present, not brought to our notice films taken of this famous actor in any of his well-known characters. It has however, brought us a letter from the Urban Trading Co., who procured an excellent picture of Sir Henry unveiling the memorial tablet of Quinn, the actor, at Bath, in February of this year. This picture was included in the Urbanora programme at the Alhambra, and was shown every afternoon for a week, from the date following Sir Henry's demise, and, as far as we are able to ascertain, this is the only life motion picture of the great actor in existence.

✤

LANTERN work can be made an important feature of public amusement, if only the trade will rise to the occasion, and not only supply the demand but help to create it. Take only two instances of innovations in both music hall and theatre—the display of artistic pictorial advertisements during intervals, and the illustrated songs. Both have proved an increased attraction, the one helping to wile away the tedious waits and the other adding value to the songs. It is not the work of managers to arrange suitable pictures for their singers. The lantern-man, however, who has tact and judgment, can score heavily in this direction. Let him think out pictures and effects suitable for a successful song, and approach the manager with something original and striking—in most cases he will be received with open arms, and as soon as singer and orchestration have been arranged, improvements will suggest themselves, and finally a successful turn will have been added to the program.

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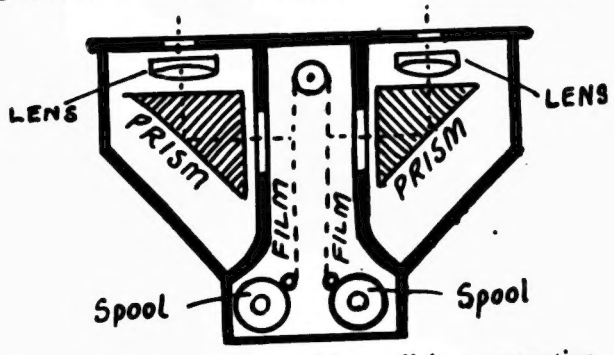
Tottenham Street, London, W.

Stereoscopic Notes.

CONDUCTED BY THEODORE BROWN.

A Prism Binocular Camera.

A United States Patent has just been issued to Mr. J. S. A. Tournier for a stereoscopic camera, composed, as far as the optical system is concerned, of a pair of lenses and a pair of prisms. The accompanying cut illustrates a plan of the arrangement. It will be seen that the apparatus is pre-eminently



suited to roll films, and enables sufficient separation of the two view points to be obtained without envolving bulky dimensions. We presume an opaque screen is placed between the two surfaces on which the dissimilar images are received; but this is not shown in the sketch.

Davidson's Rontgen Stereograms.

Mr. J. M. Davidson has devised X-ray apparatus which enables the observes to examine dissimilar phases alternating in sufficient rapid succession as to give the impression of continuity. Any foreign body, lying in the flesh of the subject, can be located, as regards its depth, with remarkable accuracy; and the apparatus should be of practical utility in all such cases in which a single photograph fails to show the exact position of the foreign substance. The apparatus is of sufficient importance to justify a detailed specification such as we give below. The body to be illuminated is placed between the phosphorescent screen 14 (Fig 2) and the two focus tubes 4 & 5, which are excited alternately by two induction coils 1 & 2. The eyes of the observer are placed opposite two openings 7 & 8, which are opened alternately by a shutter or shutters, actuated from the same axis as the interrupters of the coils 1 & 2. To obtain stereoscopic effect, the shutter is so arranged that the eye at 8 sees only the image produced by the tube 4, and the eye at 7 sees only the image produced by the tube 5. A pseudo-stereoscopic effect is obtained by changing the difference of phase between the interrupters of the coils and the shutters of the openings 7 & 8. This may be done by an interchanging switch, as shown in Fig 1. The interrupters comprise two metallic sectors 50 & 57, mounted, in opposite phase, on the rotating axis 17. The sectors dip alternately in layers of mercury at the bottom of 66 & 67, the mercury being in connection with terminals 48 & 56. The interchanging switch consists of four arms (37, 38, 39, 40) which rock on the axis 36, on which are four terminals permanently connected to the interrupters by wires 55, 51, 47 By rocking the axis 36, the ends of the arms 37, &c., dip into

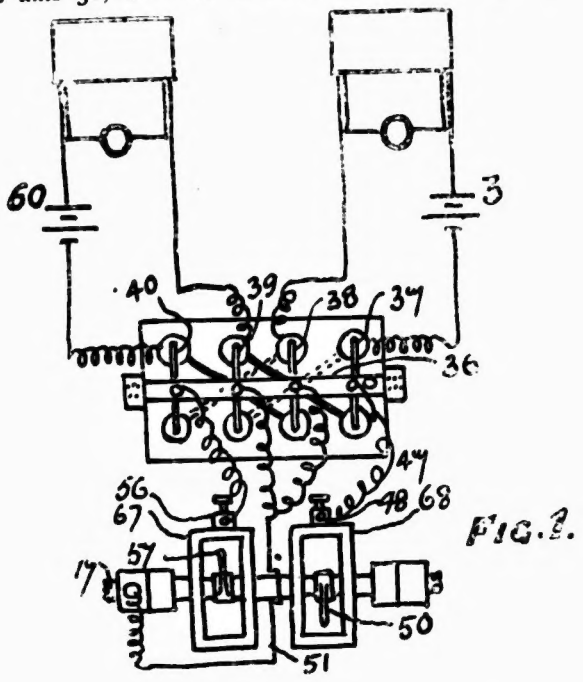


FIG. 1.

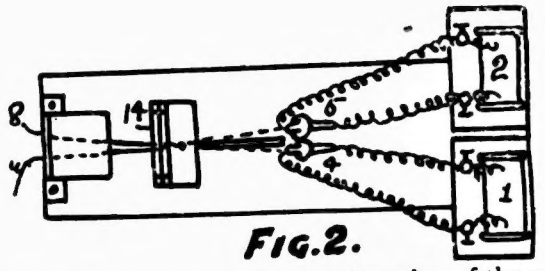


FIG. 2.

mercury cups, on one side or the other of the axis. These mercury cups are connected diagonally by wires in the insulating caseboard. The cups are in circuit with the primaries of the coils 1 & 2, and the batteries 3 and 60. It is evident that, by rocking the axis 36 to one side or the other, the interrupter which controls the action of a given coil can be changed to the other coil. A modification of the interchanging switch is described in the original specification, in which three brushes bearing on two rings on a insulating-cylinder are used.

HOW A GAS REGULATOR WORKS.

By J. Hay Taylor.

A REGULATOR for attaching to cylinders of compressed gases is a requisite piece of apparatus which ensures smoothness in illumination when employing limelight. Especially is this the case when a biunial lantern is used, for a particular pressure of gas which will serve one burner or jet will not answer when two have to be employed simultaneously; and it is here that the great value of a regulator becomes evident.

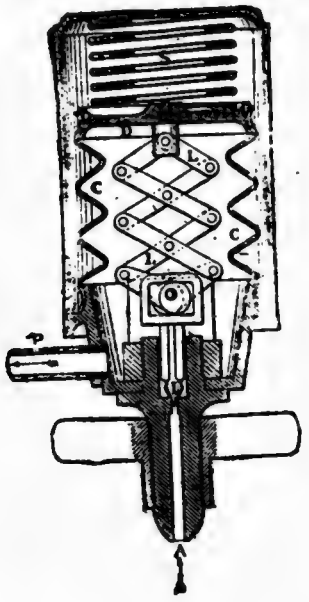
It is not sufficient to attach a regulator to a cylinder and expect it to do its duty unless the lantern operator has a knowledge of its mode of use. Some time ago I was present at an exhibition of lantern slides, and being seated somewhat near the lanternist, was highly amused at his method of fixing things up. He was using a single lantern blow through jet, and had a gas regulator attached to his oxygen cylinder. When lighting up time came, he, in a most careful manner, turned on a little oxygen, after lighting up the hydrogen side, and as soon as the air was dispelled from the nozzle he carefully adjusted the supply of house gas by means of the jet tap, and the supply of oxygen by means of the cylinder key, and in a few moments obtained a good light from the incandescent lime. So far so good, but after exhibiting a few slides he noticed that his light had somewhat deteriorated, so, in order to increase it, he again had recourse to the cylinder key, and, as soon as the supply of gas was to his liking, he gave the gas regulator one or two gentle taps, evidently thinking that it was not doing its duty properly. In this manner he proceeded throughout the entire exhibition. In this case, and under these circumstances, his gas regulator was simply acting the part of a piece of tubing, and, for all the use it was to him, might have been left at home, its only use being as a connection whereby the tubing from the jet was connected to the cylinder.

Doubtless many budding lanternists know as little about the functions of a gas regulator as the operator alluded to, so it may be interesting to, as it were, have a look inside and see what goes on there, ascertain how it is that a gas regulator regulates the supply of gas, and what are the conditions to enable it to do so.

Taking a well-known regulator (Beard's) it will be seen that at the lower end there is a screw with a cone-shaped piece A. This screw, when tightened in the neck of the gas cylinder enables the cone-shaped piece to become firmly seated in its counterpart, which forms part of the neck of the gas cylinder, and these by reason of their close connection form a gas-tight joint. The upper part contains a species of bellows C, and when the gas is admitted into this it distends upwards and rises against the pressure of a spiral spring S. To the inside part of this bellows arrange-

ment are attached rods L L, forming a lazy-tongs, so that the greater the pressure on the bellows the more tension is put on a cam at the foot of the lazy-tongs, which presses a small tapered valve I, tightly into the neck, thus stopping all further supply of gas from the cylinder into the bellows until some has been allowed to escape by means of the outlet tube P seen at the side, and to which connection is made to the jet.

Such is the arrangement of the internal parts of the regulator; let us now look to its application, for when once its mode of action is understood, and it is used in a proper manner, it will be seen that it is a most important part of a lanternist's outfit.



Old-time lanternists will remember when their gas was contained in a gas bag, which was inserted between two hinged boards, and on the top of which were placed several weights so as to press or squeeze the gas out towards the jet. Now, this gas regulator acts the same part as the old gas bag, but with this exception: the old gas bag held the entire supply of the gas to be used during the exhibition, and the requisite pressure was obtained by means of weights. In the automatic regulator the small gas bag is immediately refilled from the gas cylinder as soon as any gas is taken from it, and the pressure is derived from a spiral spring.

The gas regulator having been attached to the cylinder, and connection having been made to the jet, it is imperative to the proper working that the jet tap be closed before the cylinder valve is opened. Having opened the cylinder valve the gas bellows becomes filled and distended, consequently bringing into play the valve so that no more gas is admitted. We now turn on the jet tap and allow the gas to impinge on the lime (the hydrogen side having been previously lighted). What happens? The pressure spring on top of the small bellows forces the gas to the jet, and, at the same time, the very fact of the bellows being slightly emptied, closes the lazy-tongs, moves the cam and opens the valve, so that no sooner is a small quantity of gas used than more gas is admitted into the bellows from the cylinder. This arrangement goes on quite automatically throughout the exhibition, requires no attention whatever, and the pressure always remains the same; any regulation that may be required must be made by means of the tap at the jet itself.

Going back for one moment to the operator mentioned in the early part of this article, who, in spite of having a regulator, had to continually adjust his pressure at the cylinder valve. The reason for this was that he did not close his jet tap before opening the cylinder valve, consequently the small bellows never had a chance of becoming filled and thus using its own valve for controlling the supply, so that, as the internal force became less, more and more had to be turned on. Had the jet tap been first closed, and the cylinder valve turned practically full on, all regulation would have been automatic, and much unnecessary trouble and anxiety saved.

REMINISCENCES OF EARLY LANTERN WORK AND OF THE ROYAL POLYTECHNIC INSTITUTION.

By Professor Golding.

IN attempting to describe the reminiscences of a lifetime not more eventful than that of one's fellows, and, perhaps, far less so than that which has fallen to the lot of many, yet not altogether devoid of incident and variety of experience, the writer's thoughts are naturally directed to the days when he first became familiar with the instrument which, under the name of the "Magic Lantern," excited the wonder and delight of childhood and of early school days now rapidly receding, if they have not already receded, into the far distant past. More years than one always feels inclined to mention have elapsed since, in a northern county, the writer first handled a lantern bearing the name "Magic," a small instrument of tin plate, illuminated by a minute lamp supplied with common whale or seal oil, without anything resembling a condenser, and capable of illuminating, feebly and unsteadily enough, a disc of something like six to twelve inches in diameter, the whole apparatus "made," doubtless, "in Germany," being sold for the modest sum of half-a-crown, including a series of a dozen rudely painted slides in glaring colours, each picture occupying a circular space about the size of a halfpenny, certainly a humble beginning of greater things.

When we consider how primitive was the construction of even the more pretentious instruments in use at the time, and how inadequate the means of illumination with which they were provided appears to have been when judged from the standpoint of the present day, we are disposed to wonder, not at the insignificance of the effects produced, but rather at the excellence of the results which such appliances were capable of yielding when in skilled hands. The Argand fountain lamp, which needed to be warmed at the fire before use in order that the oil should remain liquid enough to flow freely, and which needed the lantern to be kept in a strictly horizontal position lest the wick should fail to receive a regular and uniform supply; the metal body with a lofty curved chimney to secure a sufficient current of air to promote combustion, and to allow the products to escape without admitting light to the darkened room, and the air of mystery which surrounded the whole affair in the eyes of the youthful and the uninitiated, all remain vividly enough among the memories of the past.

The slides of the comic slipping order especially were frequently grotesque enough and coarse to a degree, yet some of the better class pictures were really excellent, many of them being the production of skilled artists, who expended no small degree of care and artistic ability in their preparation. Many of them, indeed, would well bear comparison with some of the choicest productions of more modern artists in the same field. Of course, these pictures were very expensive, the time and labour expended upon them, as well as the technical skill displayed, being such as could only be secured for liberal remuneration.

The forms of lantern devised for the

production and display of more or less complicated and elaborate effects were many of them extremely ingenious and not a little curious. Such were the square lanterns with two objectives placed diagonally, which were designed and constructed by the late Mr. Dancer, of Manchester, who was also the first to employ the "Drummond" or oxy-hydrogen limelight for lantern illumination. This instrument, though heavy and somewhat cumbersome, as well as decidedly unsymmetrical in appearance, was capable of producing very excellent results, and the diagonal arrangement of the two objectives afforded some advantages in manipulation, lending itself very readily to the use of panoramic slides moving vertically as well as horizontally, either of the lanterns being readily operated in either direction without interfering with the other or being interfered with by it, while the current of hot air and the gaseous products of combustion from the lower lantern were enabled to escape without passing through or affecting the upper one. This was a marked improvement on the two distinct lanterns placed side by side, which, nevertheless, remained in favour with many workers for many years afterwards, their chief disadvantages being, perhaps, the difficulty of manipulation by a single operator, and of securing accurate coincidence of the discs.

Then came the era of the biunial, and afterwards of the triple form of lantern; the latter, in its earlier examples, an extremely bulky and cumbersome instrument, only to be lifted with difficulty, and moved from place to place with much inconvenience, but affording facilities for the production of elaborate effects requiring to be built up of two or more pictures, and so accurately registered as to appear but one. Professor B. J. Malden, happily still with us, was one of the first to carry this mode of projection to the highest degree of perfection, being ably emulated by the late Mr. Bridgman Smith, with both of whom the present writer had the pleasure of more or less intimate acquaintance, and the friendship of the survivor of whom he still enjoys.

What a crowd of pleasant memories cluster round the old Royal Polytechnic Institution, so long the home of popular scientific entertainment and instruction, a place dear to its frequenters and to two or three generations of visitors from town and country, to whom it was one of the sights of the Metropolis, which must by no means be missed by the holiday maker; the wonders of its diving bell and its innumerable attractive features being household words in every part of the British islands, not less than in those remoter lands to which the pursuit of wealth or of professional duty had for a time banished many a Briton, whose affection for the homeland and its accustomed haunts had only been intensified by absence. Here, indeed, the lanternist might see his pursuit carried to a degree of completeness only possible where the optical and other appliances found a permanent home, and where four or more lanterns could be caused to concentrate their rays upon a screen precisely adapted by size and position to receive them, and display their results to the best advantage. Only members of the staff and those privileged to penetrate into the secret recesses of the optical box and other regions not accessible to the public know the arrangements, designed for use and not by any means for ornament, by which these marvellous results, as they must have appeared to be to the uninitiated, were produced. The large skeleton lanterns with lenses, not achromatic, indeed, nor free from spherical aberration, but of several inches in diameter, were eadapted for the display of hand-painted transparencies of equally large proportions, the triumphs of the skill of such artists as Childe, W. R. Hill, and others who had carried the art of painting upon glass to the highest degree of perfection, while the supply of oxygen gas carried to every part of the building provided the means of most brilliant illumination by the limelight at any point at which it might be needed. All these displayed and described by such able expositors of the wonders of science as Professor Pepper, with his Ghost, Metempsychosis, and other optical illusions; John Langley King, whose life was practically spent in the service of the Institution, and who did not long survive it; or such popular entertainers as George Grossmith (Senior and Junior), George

Buckland, Seymour Smith, and others, whose names will be familiar to many still among us; such accomplished and genial expositors of more modern developments of scientific progress as Thomas C. Hepworth, whose loss we have so recently had to mourn; and such gifted dramatic writers as Dr. Robert Croft, a man of strongly marked personality, who, to use his own words, "called a spade a spade with remarkable distinctness," and who, under the *nom de plume* of "Tifkins Thudd, Esquire," produced many entertaining and delightful sketches besides those appearing under his own proper name, continued during many years to instruct and entertain the rising and risen generations alike.

That "the old order changeth, giving place to the new," is among the familiar commonplaces of our daily speech; and the Polytechnic, like many other landmarks of the past, furnished no exception to the rule. Its buildings and its very name have been become the heritage of an excellent and most useful Institution of a widely different kind, and no successor has arisen to follow on anything resembling the old lines; but though "lost to sight" it is still "to memory dear," and its good is not "interred with its bones."

The modern inventions of the telephone and microphone, which have so completely revolutionised our means of communication with one another, and the use of which occupies such a prominent place in our daily life, were displayed and made familiar to many of us in their infancy at the Polytechnic, where not a few of those to whom they are now familiar saw them for the first time. The same may be said of many of the most important applications of modern electrical science; and some years before its doors were closed the advances made in the art of photography had completely revolutionised the production of lantern slides, and had supplied the means of obtaining a degree of perfection in detail and accurate representation of the infinite variety of natural objects, to which the artists engaged in hand-painting, skilful and painstaking as they were, could not hope to attain.

During its later years numerous most excellent representations of natural scenery, from the rich luxuriance of tropical vegetation, the grandeur of Alpine peaks and valleys, and the milder beauties of more temperate and fertile climates, to the rigour of Arctic ice and snow, rendered with unerring accuracy by the photographic camera, were displayed on the disc in its lecture theatre; and distant lands, as well as the remoter parts of our own, were rendered familiar to those whose opportunities of travel had been few and limited, while the desire to see the wonders of the world with their own eyes had been largely fostered by the descriptions given within its walls and the views projected upon its disc, and lecturers and exhibitors went forth from it to carry the same demonstrations throughout the land, wherever listeners and spectators were found.

Only too rapidly are the relics of the London of the past disappearing before the march of twentieth century enterprise; and while the opportunity is still afforded, those which still remain may well occupy the attention of the photographer and the lanternist, who will find, perhaps, not less scope for their efforts in the same direction in others of our great cities and towns, and in the scenes of rural life.

How many of the Londoners of to-day recollect Holborn Hill or Middle Row, as they appeared when the present writer first became familiar with them on taking up his residence in the Metropolis from the great northern city in which his early years were passed?

On entering Holborn from Gray's Inn Road, the row of quaint old timbered houses which now face the pedestrian were hidden, or almost hidden from view, by a sort of island in the centre of the road, on which stood a row of old and dingy buildings, separated from the timbered houses above mentioned by a narrow footway somewhat resembling the thoroughfare of Holywell Street and Bookseller's Row, now in their turn swept away for the widening of the Strand in connection with the new thoroughfares of Aldwych and Kingsway. It is said that threatened men and, perhaps, places, live long, and certainly Middle Row had so long been threatened with extinction that the threat had ceased to be regarded as serious by

those interested in the old order of things, though the effect of the obstruction was to narrow the thoroughfare of Holborn to about one-half of its width on either side.

This venerable eyesore, for such it was to most of those who bestowed any thought on the matter, finally yielded to the imperious demands of traffic and of street widening upwards of thirty years since; and when once removed safely out of the way, it left little behind it except wonder that its intrusive presence had been tolerated so long. About the same time, the steep descent of Holborn Hill to the level of Farringdon Street at its junction with Snow Hill, and the almost equally steep ascent of Skinner Street, leading to the corner of Newgate Street and the Old Bailey, disappeared not to return, the valley of the old Fleet Ditch being bridged over by the Holborn Viaduct.

This, with the consequent widening of Farringdon Road, swept away a very squalid and unseemly group of streets and alleys of unsavoury aspect and evil repute, made memorable by Charles Dickens as the abode of the evil-doers who figure so prominently in "Oliver Twist."

Staple Inn, indeed, remains as a relic of the past; but Furnival's Inn has been completely rebuilt, and the quaint and picturesque old inn yards of the Bull and other ancient hostelries adjoining, with their low-roofed rooms, diamond-paned windows, and open galleries surrounding the central area, which led to bed chambers above, almost the last of their kind remaining in the Metropolis after Chaucer's "Tabard" had vanished from the Borough, have also had to give way to the demand for more modern and commodious structures, better suited to the purposes of twentieth century trade and civilisation. Indeed, the London of Charles Dickens and his contemporaries is fast disappearing, and has already largely vanished, while those parts of it which yet remain are daily threatened with extinction. If the lanternist has any views of these relics of the past let him cherish them carefully, and for those which are still spared to us let no opportunity be lost of securing their counterfeit presentments for the edification of those who come after, and who may desire to realise what manner of streets and houses those were which figure so prominently in the pages of our historians and writers of fiction, whose genius has enshrined and immortalised these old-world scenes, and peopled them with past generations of men.

And what applies to Old London is equally applicable to the condition of our other great cities and quiet provincial towns, which are rapidly losing much of that which links them with the past, and with the stirring events of days gone for ever, but which have left none the less an indelible mark on the history of our nation, and have done much to mould and shape the destinies of our people during our own and succeeding generations.

"Let Erin remember the days of old!" How vivid a recollection the writer has of pleasant days spent in the Emerald Isle in earlier years, amongst friends most of whom have already joined the majority in the unseen land, and amid the scenes of events far more ancient: hoary round towers, sculptured crosses, venerable ruins of ecclesiastical foundations, dating from the early centuries of Christianity and the visits of its first messengers, and many of them from an antiquity so far more remote still that its date can only be conjectured and its conditions inferred from the relics of ancient faiths and ceremonials which have survived the ravages of untold ages, and the storms of more centuries than even conjecture can well define.

These solitary and almost deserted spots, the seats of learning and devotion and of activities long since at rest, afford almost boundless scope for the energies of the photographer and the lanternist, who may find innumerable scenes and objects well worth depicting, to show their less travelled countrymen what wealth of of interest and beauty still lies hidden in these islands "set in the silver sea."

THE MONTH'S NEW FILMS.

From THE VINTNER'S FESTIVAL (*Urbanora*).

How time flies! Once again we are writing our notes for the last month of the year, and are looking back upon a year of fairly good business, in which a quantity of interesting subjects have been produced and important strides towards perfection in the art of cinematography, have been made. That the festive and merry season is close upon us is clearly shown by the titles of the new films we have to review. "The Christmas Goose" appeals to all of us, whilst "Santa Claus Mistake" and "The Discovery of Santa Claus" will no doubt attract the attention of the Juveniles.

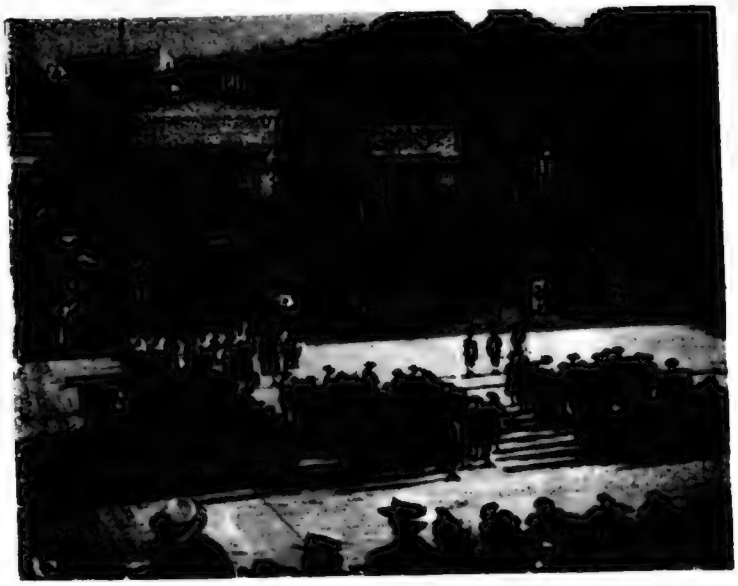
MR. R. W. PAUL has some excellent novelties this month, which we can safely recommend as an additional improvement to any programme, "A Shave by Instalments" is irresistibly funny, and deals with repeated attempts by the head of the family to compass a shave, but meets with so many interruptions through the mischievousness of his youngsters that he has to finally abandon his attempt in despair. "The Eccentric Barber" is another film on totally different lines, and introduces quite a novel conjuring show. Two men, one black and the other white, go into a barber's shop to be shaved: they are firmly fixed into their chairs, and go through extraordinary adventures, such as making an exchange of heads, and having a live rabbit taken from the black man's scalp. Finally, the victims retaliate upon the barber, by totally dismembering him. A complete representation of a "Spanish Bull Fight" is a film that should appeal to lovers of sensation, as the whole is depicted in the most faithful manner, from negatives taken on the spot. The opening shows the procession of matadors, with their horses and paraphernalia, after which all the incidents of a bull fight are given in detail. In the course of the scenes, no less than five horses and one matador are killed, and the bull is finally slain and carried in triumph round the arena. Each film is of excellent quality throughout, and fully sustains the high character which this firm have gained.

MESSRS. PATHE FRERES are now offering the first of their 'Xmas subjects, called "The Hen that Laid the Golden Egg." This subject is excellent, and, as it is appropriately tinted, the whole has a gorgeous effect. The transformation of the hen house into a splendid palace is most cleverly done. These gentlemen are also offering another subject, entitled "A Xmas Miracle," which is not of such an elaborate nature as the one we have previously referred to, but the scenery and general surroundings are more seasonable.

THE CHARLES URBAN TRADING CO. have a most interesting series running at the Alhambra, called "Le Fête des Vignerons," which is the vintners' festival of the four

From THE VINTNER'S FESTIVAL (*Urbanora*).

seasons at Vevey, Switzerland, and is held four times in a century. We give four illustrations from this film, which show the tremendous amount of detail and the great number of figures which take part in the ceremony, upon which the confederated canyons periodically spend about £40,000. We do not remember a film containing so much animation and interest, and certainly class this as another of Urbanora's huge successes.



From THE VINTNER'S FESTIVAL (*Urbanora*).

MESSRS. GAUMONT & Co. have a strong hand in their pantomime film called "Beauty and the Beast," which is a real children's fairy story, worked out in appropriate Old English costume, whilst their "Santa Claus Mistake" is brimming with humour. There is some brilliant comedy in "How Brown brought Home the Goose" (450 feet), being the adventures of a thirsty parent on Christmas Eve. We predict a large sale and unprecedented popularity for this picture. "Moose Hunting in Canada" (520 feet) is educative and thrilling, the interest being sustained throughout; it is one of those pleasing natural pictures which are sometimes so hard to secure, but are always well worth the trouble and risk entailed. One of the funniest of short comics is "A False Alarm" (200 feet). An inebriated swell, whilst strolling home in the "wee sma' hours," sets fire to his portmanteau in attempting to light his cigar. Being near a fire alarm he calls up the brigade, with ludicrous results.

From THE VINTNER'S FESTIVAL (*Urbanora*).

MESSRS. CRICKS & SHARP have selected another bird to hang their Christmas film upon, and their "Carving the Christmas Turkey" is most amusing. We only hope that none of our readers will have the same trouble with their bird as is shown in the film that we are referring to. Their "Adventures of an Insurance Man" is also very amusing, and is a really good knockabout film. Amongst other new films issued by this firm may be mentioned "The Horse Stealer," "Peeping Tom," and "The Old Homestead," each of which are in seasonable spirit and should prove popular.

THE WARWICK TRADING CO. have a splendid film of a bull fight which took place before President Loubet and the King of Spain at Madrid a little time ago, and they are shortly going to offer to the public a film entitled "The Foxton Lifts," which shows a canal boat, carried from a low level canal, being taken up the side of a hill by a steam railway, and placed into another canal. This is one of the most interesting subjects we have seen this month, and the quality is perfect.

Illustrated Interviews. No. 7.

HUGHES & CO., of "BREWSTER HOUSE."

A CHAT WITH MR. CHARLES D. BISHOP,

Author of "The Art of Projection," etc.

AN interviewer has opportunities of discovering the prevailing fads and fancies of individuals, especially of those ready to talk, whether they have anything of interest to speak about or not, and consequently betray their special weaknesses. It is, therefore, refreshing to find a man willing to talk, with good, sound knowledge, and an intimate acquaintance with every phase of the subject introduced.

CHARLES D. BISHOP.

Such a man our representative found Mr. C. D. Bishop, of the well-known firm of Hughes & Co. This gentleman has literally grown up with the business, and, although yet a comparatively young man, has been connected with Mr. W. C. Hughes during a period of over a quarter of a century, in fact, the whole time the firm has been in existence.

As the career of Mr. Bishop is almost inseparable from that of Mr. Hughes, we will first briefly sketch the main points connected with the business. Mr. W. C. Hughes has all his life been interested in lantern work. Originally a chemist, he exhibited an absorbing interest in photography, and soon took to experimenting, and then found there was money to be made in the lantern trade. He ultimately commenced in business with a determination to improve upon existing appliances, his idea being that the public were ready to pay for the *best*, whether in lanterns or slides This idea he carried into effect, and it has proved one of the main factors of his business life, and to a large extent has contributed to his subsequent success. His chemical knowledge, combined with exceptional entertaining powers, also proved of valuable assistance, especially as he made the perfection of dioramic effects his peculiar study in connection with the science of the optical lantern.

When the idea of projecting animated pictures arose Mr. Hughes was in his element, and quickly entered carefully into the subject, and now the cinematograph has no sincerer enthusiast than himself.

As an operator and lecturer, Mr. Hughes

has also been successful, repeatedly giving his services in aid of charitable objects in addition to fulfilling many lucrative engagements. He has been identified with improvements and inventions in connection with lantern and cinematograph appliances, to which cause, no doubt, may be attributed the fact that to-day the firm of Hughes & Co. is one of the best known and appreciated houses in the trade.

Mr. Bishop has been the right hand man during the firm's existence, and has contributed very largely to its success. He was first interested in lantern projection 26 years ago, and is a holder of the diploma of the Worshipful Company of Spectacle Makers—he has made slides from subjects and negatives which have proved vastly interesting from a photographic and scientific point of view. He is eminently practical, as his book on the "Art of Projection" readily proves. In the course of the interview he spoke of the great changes and improvements made in the lantern, first mentioning the introduction of the "Phantasmagoria," an illusion by the aid of the lantern that was thought to border on the supernatural, and proved a great monetary success. It was brought out at the Lyceum Theatre, in 1848, upon which occasion lime light was used for the first time. This illusion we describe in Mr. Bishop's own words: "Professor Phillipstahl commenced his seance by appearing on the dimly lighted stage with a small lighted lamp in his hand, saying, "Hush, de ghost, de ghost," with the idea of adding all possible mystery to the proceedings; he would then put the lamp out and retire. The curtain quietly arose disclosing a mass of clouds, which slowly opened exposing a ghostly figure, which appeared gradually to increase in size, and advanced as though about to come amongst the audience, finally retired, clouds covering the phantom, and other figures took its place, some of a horrible character appearing and vanishing in like manner. He informed his audience that he could produce any departed relative at will, and as the figure was so enveloped in drapery there was no fear of recognition or contradiction."

"After the Phantasmagoria came the Chromotype, invented by Mr. Childe to introduce dissolving views. Then followed quite a revolution in lighting by oil, through the Scioptican lantern, by Mr. L. Marcey, of Philadelphia. The Triplexicon, Pamphengos, the Biunial, and the Triplicate each showed improvement, both in lighting and effect. A sure sign of the popularity of the Pamphengos lantern lies in the fact that over 4000 have been sold since they were first introduced, seventeen years ago."

"As the lantern progressed in utility and effectiveness," continued Mr. Bishop, "so the slide became more and more natural and beautiful. From the early efforts in single color, to the present brilliantly tinted slides, the march of progress has been distinctly visible; a good photograph well painted is a picture and a pleasure, but a photograph daubed is an eyesore and cannot be appreciated. The day for glaring colours is past, art tints and soft neutrals are steadily advancing in favour."

Knowing that Mr. Bishop has done a great deal in operating for entertainment purposes, we asked for some experiences.

"I remember being engaged to give a special lantern entertainment in one of the large halls in Birmingham, and had everything in readiness. I had been specially careful about my cylinders, and was in the act of fixing up when I discovered that someone had tampered with the oxygen which had all escaped. Here was a dilemma. It wanted a quarter of an hour to the time fixed for my show. I rushed out and found the hall keeper, who very kindly informed me that all the likely shops were closed. He seemed to enjoy my difficulty, but suddenly remembered that a previous operator had left some 'lumber' behind him, and I was welcome to look at it. I quickly acted upon the hint, and found, to my joy, amongst the 'lumber' a large cylinder of oxygen. It was fastened with a patent key, but by the aid of a hammer and chisel I quickly got at it, and found sufficient oxygen for my requirements, and the show proceeded without anyone in the audience being aware how near they were to being deprived of their entertainment."

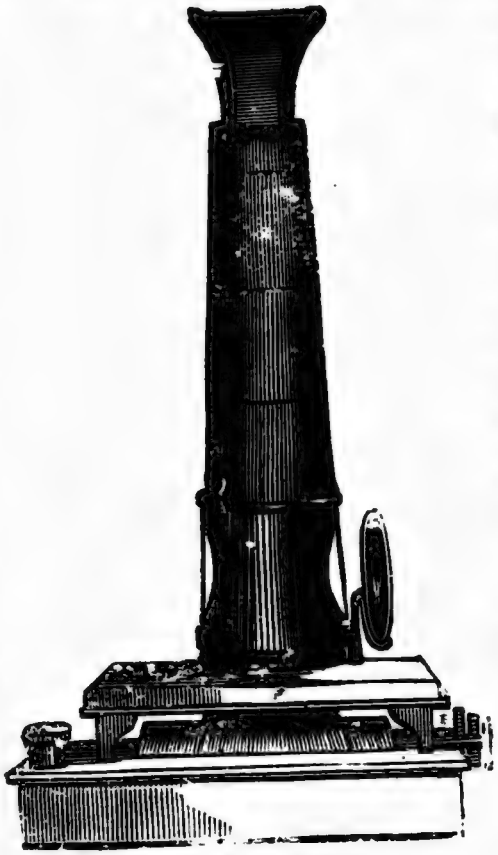
It is interesting to hear how candidates for Parliamentary honors have been as-

sisted by the lantern. Mr. D. Ford-Goddard, M.P. for Ipswich, was one of the first of these. Mr. Bishop and he, with a triple lantern with cinematograph attachment, toured the division showing specially painted pictures, with the object of capturing Liberal votes. Mr. Goddard was returned by a large majority. In many cases there would have been difficulty in securing a hearing for an ordinary speech, but the lantern views proved quite to the liking of the constituents, and always had a good reception. The late Captain Selwyn, formerly Conservative member for Wisbech, was another firm believer in the lantern, and was assisted by Mr. Bishop in more than one successful campaign. He had a special van made to carry the paraphernalia, which included a Docwra triple lantern with sets of beautiful slides, not always of a political character, but of the kind best calculated to keep an audience in a good humour.

Taking another branch of the business, we learnt that many well-known professional entertainers have been supplied by this firm with apparata for tableaux, serpentine dances and the like. Amongst their distinguished customers may be mentioned Sir David Salamons, Madame Patti, Stuart Cumberland, B. J. Malden, Colin Docwra, Lord Rosse, Dr. H. Gratton Guinness, Canon Scott and Miss Weston.

Mr. Bishop claims that his firm was the first to induce the clergy to use the lantern in the church, the Rev. Wilson Carlile, of Church Army fame, being one of their earliest customers. The Society for Promoting Christian Knowledge afterwards entrusted them with the carrying out of a big scheme, to supply the clergy with slides for lectures on Church defence, and, as some three dozen pictures of over a hundred subjects had to be prepared in six months, it taxed their studio facilities to the utmost. It is an interesting fact that these lectures were the means of bringing about the present institution of Church Defence, and gave the party a more intimate knowledge of Church history.

Mention of the cinematograph and its uses and possibilities, enabled Mr. Bishop to give us the following interesting details:—"I consider it was in 1887 that the first real step towards the making of the cinematograph was commenced. We constructed special condensers and lenses for Mr. Freese Green, and in the Crystal Palace Photographic Exhibition of 1888 this lantern, with a belt of slides, was shown, much in the same way that we now use films. At this exhibition we carried off the only prize awarded for lanterns. In 1897 our first machine for projecting animated pictures first saw light; this was with what is called the dog movement, and I doubt whether it really ever has been improved upon. We have made machines to work vertically, a piston-shape movement working horizontally, and the plunger movement. In our Pictoroscope we had the spools to run over ball bearings, and in the Bio-pictoroscope we first patented a moveable roller, over which the film ran, which enabled the film to be centred without moving the cage or lens.



THE TRIPLEXICON.
One of the earliest types of lamp.

"The cinematograph up to the present has not taken the place of the lantern from the more serious point of view. It is chiefly a source of amusement, and introduced as a side-show, whilst the lantern stands first as a teacher."

The projection of solid objects on the screen is one of Mr. Bishop's favourite studies which he intends to pursue in the future, and he is confident of achieving success in this direction. It was in 1891

that Dr. Lant Carpenter, of Prince Town College, New Jersey, U.S., commissioned Mr. Bishop's firm to make an instrument to project from a solid object, 4 ft. square, giving stereoscopic effect, and this stimulated them to produce the Alphengo Enlarger, which has more than fulfilled their expectations in this branch of work. Asked if he had any particular hobby, Mr. Bishop replied:

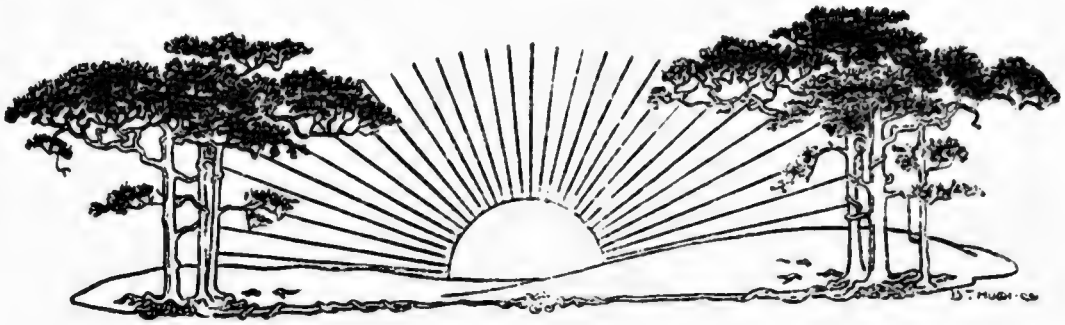
"Oh, yes, the really scientific side of the study of light is my pet hobby, but, unfortunately, it is the side that does not pay as a commercial undertaking. The study of Polarised light is the most fascinating of all projection work, and when the electric light became more and more commercial in its use, I felt the hope of my life had been realised. It is astonishing how ignorant some people are of the use of electricity. Recently we had a man ask for some one pound tins to be sent him, whilst another wanted to know if it could be used like acetylene by *adding water*."

Want of space prohibits us mentioning all the various departments of work carried on at Brewster House. In the well-kept warehouses, showrooms, and operating rooms every aid to both optical lantern and cinematograph exhibitions are to be seen, and there is no doubt that, under the capable management of Mr. Bishop, the firm of Messrs. Hughes & Co. will still continue to hold its high position in the lantern and cinematograph trade.

THE MONTHLY CARTOON.

(With apologies to the designer of the well-known trade mark.)

MR. CHARLES URBAN, writing to THE OPTICAL LANTERN AND CINEMATOGRAPH JOURNAL last month, said: "Although extremely preoccupied with the many details of our business, I shall, nevertheless, be pleased to 'start the ball rolling' towards a better understanding between the serious minded members of the trade."



ROUND AND ABOUT.

The Prince and Princess of Wales in India.

Several camera men are laying in a stock of films of the chief events of this tour, and we shall soon be able to judge with what success. Mr. Rosenthal has lost no time in joining them, and after his return we believe he starts for Australia.

Brighton Aquarium.

The daily round of attractions at the Brighton Aquarium include performances of the naval spectacular production, "'Twas in Trafalgar's Bay." Each performance terminates with a series of up-to-date naval pictures, shewing the progress of the Navy during the last hundred years.

Free Slides of Hastings.

Mr. Charles A. Tharle, hon. secretary Hastings and St. Leonards Borough Association, has on loan without charge, a carefully arranged series of lantern slides illustrative of Hastings and its historic and beautiful scenic surroundings. With the slides is sent out a descriptive lecture, so that the audience may fully realise the associations of the various pictures.

Lantern Lectures on Canada.

Mr. H. M. Murray, Canadian Government Agent, Western Mail Buildings, Cardiff, will be glad to place at the disposal of clergymen, school teachers, or other gentlemen (for lecturing purposes) a set of lantern slides depicting scenes of Canadian life and work from the Atlantic to the Pacific. As the demand for these slides is great, early application is necessary so as to arrange dates ahead. A printed lecture describing each view accompanies the set.

Cinematograph in Politics.

A political "revival meeting," under the auspices of the Primrose League, was held a day or two ago at Wargrave. The feature of the meeting was 1,500 feet of cinematograph pictures shown by Mr. Lewin Fitzhamon. Starving men and women were depicted stretching out their hands to the "large loaf," for which they have no money to pay. A second series, entitled "The Unemployed Question Must be Solved," shows strikingly the results of the present lack of employment in England.

Urbanora.

The management have lately had a busy time. On November 21st a show was given on H.M.S. Nile, at Devonport. A 30-foot screen was strung up on the fighting mast, and about 2000 officers and men witnessed the series that was given at the Alhambra last August, in honour of the visit of the French Fleet. Favoured with a fine night the entertainment was huge success. They also recently gave a show, for the Automobile Club, at the Albert Hall, when a brilliant picture was shown, 42 feet wide with a throw of 165 feet. About 8000 were present, and repeated applause testified to the appreciation of the pictures.

The King of the Hellenes Filmed.

While on the subject of moving pictures, I may mention an experience of the King of the Hellenes which incidentally shows what a go-ahead world we live in nowadays. His Majesty, accompanied by Queen Alexandra and other Royalties, visited the Hippodrome this afternoon and witnessed the performance. As it was nearing its close, the Queen expressed a wish that the bioscope should be brought into play showing her brother's entry into London. This "royal command," though not in the programme, was, of course, immediately complied with, and King George, it was evident, was highly amused to see his animated counterfeit thus brought directly under his own eyes.—*Manchester Courier.*

Making Hymn Slides.

Slides of hymns and songs for lantern work can be very easily made, and are exceedingly useful to those who do much lantern lecturing. Maps and plans can be made on the same system, and also scientific diagrams. The simplest plan is to take a negative of the hymn or map and use this for projection. This print will appear as white letters on a black ground, and stand out very clearly upon the screen. Black tone slow lantern plates should be used, and focussing should be done with great care. The exposure can only be settled by experiment; the makers of the plates will probably give information on this score. Magnesium ribbon is the best illuminant, and hydroquinone developer should be employed. The latter should be weak, and the developing tentative. Every care should be taken to ensure even lighting of the object photographed. The letters should be absolutely clear glass, and the background a good clear black.

Uses of the Cinematograph.

Mr. F. Martin Duncan, in a paper which he read before the Society of Arts, claimed that there was scarcely any limit to the uses of the cinematograph or to its educational value. Cinematography, he said, owed its inception to Ptolemy, A.D. 130, and it had progressed through the stages of Faraday's wheel and the zoetrope. Mr. Duncan's paper was devoted to the importance of cinematography in the study of natural science, and the illustrations which were placed upon the screen of microscopic forms of life, of zoology and botany, electrical and physical phenomena, medical science and chemistry, besides being wonderful, were at times exceedingly humorous. He also claimed that in the cinematograph exhibition could be found a ready, agreeable, and important means of educating and enlightening the minds of the masses. As an example of the value of the cinematograph for anthropological work, Mr. Duncan showed a devil dance in Borneo. The march of civilisation was rapidly defacing native customs, and it was important that some means should be adopted of placing them on record. For demonstrating colonial industries as an inducement to emigration, the cinematograph was the best agent possible, reproducing in living pictures the work going on in our colonies.

Some Lectures of the month.

November is the great month of the year for lectures and entertainments, and this month has been very prolific of lectures on various subjects illustrated by lantern slides. Among others we find Mrs. Bullock Workman lectured at the Royal Geographical Society upon her travels in the Himalayas, and showed many excellent slides of her perilous climbs. Mr. E. A. Parkyn, M.A., added interest to his University extension lecture on "The Older Stone Age Man," by some slides, some of which were slightly imaginative and which the lecturer was careful to explain, showed a large return of conjecture from a small investment in fact. Mr. J. Williams Benn, M.P., has been busy with his lecture "A Trip to the Rocky Mountains"; and Mr. Harry de Windt, the well-known traveller and author, has lectured on his recent journey to Servia, Bulgaria and Roumania, both slides and films being used by him. At the Cardiff Gardeners' Association, the lantern was brought into play to illuminate a lecture on "Hardy Plants and Informal Gardening," and we found it again in use at a lecture before the Liverpool Horticultural Association. Professor Gregory started the series of Monday Free Lectures, in connection with the University of Glasgow, with a lecture on "The Nineteenth Century's Work in Africa."

Information Wanted.—Not by the Pupil this Time.

The following letter lately appeared in *Educational News*:—"Sir,—Having often entertained the idea that your valuable paper might be made a more effective means of conveying information to, and removing the difficulties of, those who dwell more or less apart from their fellow-teachers, I venture to ask from those qualified—of whom there must be many—aid and guidance under these circumstances: I am the headmaster of a fairly large school, who have had the offer of a magic lantern, and a good one, from a gentleman interested in the welfare of my pupils. Hitherto I have hesitated to accept this offer, chiefly from a fear that I might be unable to use the instrument to advantage. The points on which I desiderate information are these:—The name, maker, and cost of a very good, but not extravagant, lantern, plus the cost of the additional apparatus (specified) necessary; the kiud of light to be used (there is gas in the school, which would be available if satisfactory); the subjects in the curriculum of an elementary school which a lantern would best illustrate; the means by which, and the probable cost at which, a supply of new slides could be maintained, say for three or four years, along with any other information which would readily occur to an expert, and be, along with the rest, gratefully received by one who, on this subject, must confess himself little better than an IGNORAMUS."

Correspondence.

ANOTHER INCOMPETENT.

Sir,—I feel strongly on the question of cinematograph exhibitions given by firms of film makers and syndicates. If the principals themselves did the operating it would be very different. The following was told me by an electrician:—A London firm made a contract with a certain music hall, and sent a man down for *one week*, after which a young fellow, employed in the shop of my informant, received a week's instruction, and was left in absolute charge. I saw the show, and found that the pictures were not in the centre of the sheet, and far from sharp, the light was not properly centred, and, the most important point of all, the machine was standing in the open where the public had to pass. A certificate from some high authority should be obtained before any person is allowed to operate in a building where the public are admitted.—Yours, etc., J. LEWIS, 29, Salisbury Avenue, Colchester.

MENDING FILMS.

Sir,—Can you help me in what I consider one of the greatest difficulties we operators have, namely, the quick joining up of films that break in the process of exhibit. Of course, like the majority of my confreres, I take advantage of the homely pin should the film break after passing through the gate, but frequently I have breakages happen in the most awkward positions. Is there not some small fastener that could be used, which would pass through the gate without injury, as time after time I have found the solution will not properly stick the film together? Another disadvantage with pins is that one is apt to overlook them with the consequence that, in running the films through again, the pins get in the gate and tear a lot of the film u', at least that is my experience. Can you suggest a remedy?—Yours, etc., F. WRAY, Barnstaple.

Reflections.

It was but natural that "Our Navy," which has had so long and successful a career, and which has done so much to popularise the service, should be followed by a series depicting the life of the "Lad in Red." The new series is called "The King's Service," and the Union Jack Club is to receive a portion of the profits made when the exhibition tours the country.

"The Building of a Railway" has been quickly followed by a companion picture, "The Building of a Motor Car." There are others to follow.

There will probably be some fun shortly on the question of the springs used for condenser fittings. By-the-by, was it not about eight years ago that so much was heard of this same subject, and were not their advantages illustrated and advocated by Mr. J. Hay Taylor? It will be interesting to learn some new facts about these appliances.

The Great Eastern have gone a step further than the other big railway companies. Not only do they loan slides and lectures descriptive of the interesting features of their line, but they loan cinematograph films descriptive of a steamer from the Hook of Holland approaching Parkstone Quay, passengers coming ashore, and the boat express leaving for London. There will soon be no need to even hire films.

"What is the percentage of shrinkage (!) to be allowed in buying listed films?" asks a correspondent, who states that he ordered a subject listed at 175 feet, but which, on measuring, he found was 16 feet short. He is lucky in finding humour in the matter—other correspondents write us very severely on the self-same subject. Moral: Measure before you pay.

At a certain palatial building not a hundred miles from Charing Cross, where the living pictures are relegated to the last turn in the program, it is funny to notice the way the show is abbreviated or lengthened to fill up the program. The other afternoon, however, they went from the sublime to the ridiculous. The series of "new animated pictures" were reduced to a three minutes show, consisting of a portrait of the King and part of one film. It is this kind of treatment that causes the audience to say unkind things about living pictures.

The Nelson Centenary caused slide dealers quite an exciting time rummaging up slides suitable for the occasion, and very funny some proved. It would take a big stretch of imagination to believe in the genuineness of some we saw. Rather ludicrous, too, was it at a concert to watch the face of the singer who, with deep pathos, sang the "Death of Nelson," illustrated by a series of slides which had got mixed with some comics.

"No oysters for Christmas." Such an alarming condition of affairs is attributed to the increased sale of the delicious bivalve since "The Oyster Industry" was shown on the Alhambra screen. One company's sale of oysters alone has increased fifty per cent. on last year.

The special epicure attached to our staff says oysters and whiskey "don't go well together." When Urbanora produce their new series "What is Whisky?" they will withdraw the oysters, but we hear that Professor Duncan's animal series will go on instead. We have heard of certain animals being very apparent after too much whisky.

An operator friend says "What is Whisky?" savours too much of the Law Courts, and suggests the title should be altered to "From Barley to Booze." By the way he would make an excellent subject for a new film entitled "From Projector to Pub."

One of the greatest novelties at the toy stores, this season, is the lantern with the ingenious internal arrangement of mirrors by which a collection of printed postcards or photographs can be projected. Its origin was Germany, from which country the toy living picture lantern arrived last year in time for the Xmas trade. The curious part is that hardly two shops are selling the same article at the same price. They vary from 22/6 to £2 for the same equipment.

What is the most pathetic subject ever filmed? We recently saw a crowded house of about 2000 watching "Rescued by Rover," and, at the finish, there was hardly a dry eye, and the rush to the bars for "consolation" was painful to our temperate principles.

Is a certain well-known bird a common or garden rooster or the hen that laid the golden egg?

Our cartoonist thanks those traders who have sent along photos and full length oil paintings. He is not giving a prize for answers to "Who's Who?"

THE NOVELIST AND THE CINEMATOGRAPH.

Lloyd's Weekly News of Sunday last contained a story entitled "What a Cyclist saw in a Cinematograph," and the writer evidently possesses a finer imagination than a store of absolute knowledge of living pictures.

Starting with a cyclist, whose weak point is unfailing gallantry, and who, in passing a steep bank by a lonely roadside, sees a young and interesting female in a very perilous position, he offers his assistance to obtain a spray of sloe-berries to decorate her hair. Leaving his bicycle in the roadway, he climbs the steep bramble-covered bank, on the other side of which is an old marl-pit full of water, weeds and rushes. Gilbert, for such is the hero's name, is leaning over the summit of the bank at a very perilous angle, when suddenly a figure rises above the hazel bush, Gilbert's feet are tripped from under him and he is taking a header into the water. Dashing the water and slime from his eyes he gets to the top of the bank in time to see the villain of the act, in the correct villainous check suit, and the guileless maiden disappear on bicycles—one of which he recognises as his own.

Chapter 2 is headed "The Greatest Wonder of the Age—the Cinematograph or Living Pictures." In this chapter, we find our hero dry, and, we presume, not quite so amenable to the ravages of the fair sex after his cooling bath in chapter 1. Of course, he has been to the police, where Detective Williams says that looking for the bicycle is akin to searching for the proverbial needle in the hay-stack. To forget his loss, or wile away the time (as he cannot now bike) he turns into a place of amusement.

"The lights were turned low, and Gilbert saw before him a dark screen, with a luminous patch, ten feet square, in the centre. The luminous surface seemed agitated by a ripple, there was a click-clicking sound from behind, and then, before Gilbert's astonished eyes, there appeared all the sights—without the sounds—of a busy thoroughfare.

"The magician behind the screen set the mechanism going again, and a railway station and all its accessories appeared. Round the bend came the engine, and grew and grew, until it ran out of the picture on the farther side, and pulled up with the carriages in view.

"What a scene of activity! Every door flew open, and all sorts and conditions jumped out' meeting friends, exchanging greetings, hastening away, and the waiting passengers stepped in. Porters slammed the doors—without noise for once—and those who were seeing friends off talked to them through the windows.

"But why does Gilbert sit with staring eyes and parted lips? Coming down towards him, as it were, from the tail of the train, gaily chatting together, and wheeling their bikes, are two people he would have known anywhere. One was the girl with the blue eyes, and the other the check-suited scoundrel who had tripped Gilbert into the pit. Aye, and if he was not greatly mistaken, the man was trundling the very bike he had stolen.

"At this juncture a long-nosed, dark-visaged individual, frock-coated and elderly, came into the picture, and the couple fell upon him with great glee. The girl laughed, the two men clapped one another on the shoulder, and the younger man patted the saddle of his machine—pop! it was gone! and the luminous rectangle gleamed again before Gilbert's eyes with provoking blankness."

Gilbert has a hasty interview with the manager of the cinematograph as to where the pictures were taken, and this gentleman informs him "the fellow has all his plates named and dated—he showed me the label Unswick Railway Station, E.C., September 2nd, 1902." [We should be glad to hear of this new apparatus for the cinematograph, in which *plates* play so important a part.] Next day they visit the man with the *plates*, with the head of the police, and a review is taken of the pictures, and when the frock-coated gentleman smacks the check-suited villain on the back, "Old Israel Levi as I live," exclaims the detector of crime. Chapter 3. Gilbert and the detective, on the pretence of buying a bicycle, visit Levi's store of questionable goods. He recognises his old machine with a new coat of enamel, and, with the idea of raising the handle bars, takes off the head of the machine, inserts a button hook in the handle-bar "and quick as thought flicked out a small piece of parchment, which he handed to the detective, on which was his own name and address." The villain in the check suit, at this particular juncture, visits Levi, there is the inevitable scuffle, when two big policemen and other detectives arrive on the scene and the whole gang are arrested, but the blue eyes that led Gilbert into the snare have an influence for good on the jury and she is acquitted. TABLEAU!

ROUND THE TRADE.

Houghtons, Ltd., High Holborn.

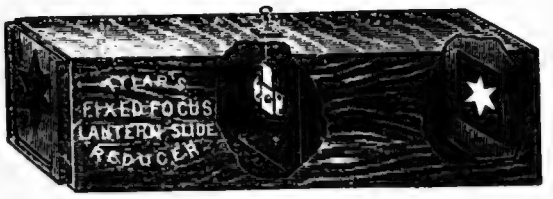
Excellent are the new models of optical lanterns which Messrs. Houghtons have put on the market this season, and it is difficult to make a distinction with so many good lines. The illustration we give is Model 30, which is strongly finished in japanned tin with hinged panel door and fibre handle to prevent it getting hot. The extended base is to take the chimney when packing up. Metal spring stages hold the carrier with an adjustable brass front tube. A 4in. plano convex condenser is fitted in a brass mount with loose lenses for removing to clean. Very seasonable lines are the Christmas card mounts, of which this firm have a wonderful assortment, and from which the most fastidious can be satisfied.

The Walturdaw Co., Dean Street,

Have just put on the market a film rewinder that is simplicity in itself, and should prove a great boon to the operator. Two spools are mounted upon a stand, and are driven by geared wheel, so that the operator can instantly rewind his film in readiness for the next exhibition. It is also of great service in joining films together in a quick and effective manner. Fittings are supplied by which the stand may be firmly clamped on an ordinary table in the workshop, operating room, or at home. The price is reasonable, which is an additional recommendation, and should cause the film rewinder to be in great request. This firm have just issued their new Entertainment List, which is full of good things, and should be in the hands of all exhibitors.

Tylar's Fixed Focus Enlarger.

Mr. Tylar, of Aston, Birmingham, is placing on the market an enlarging apparatus of the simplest possible nature, the negative being inserted at one end and the bromide paper at the larger end (see accompanying illustration). As the maker suggests, the price of the apparatus is not prohibitive, and the enlarger makes a very suitable present to anyone using a quarter-plate camera, and who has not as yet gone in for enlarging.



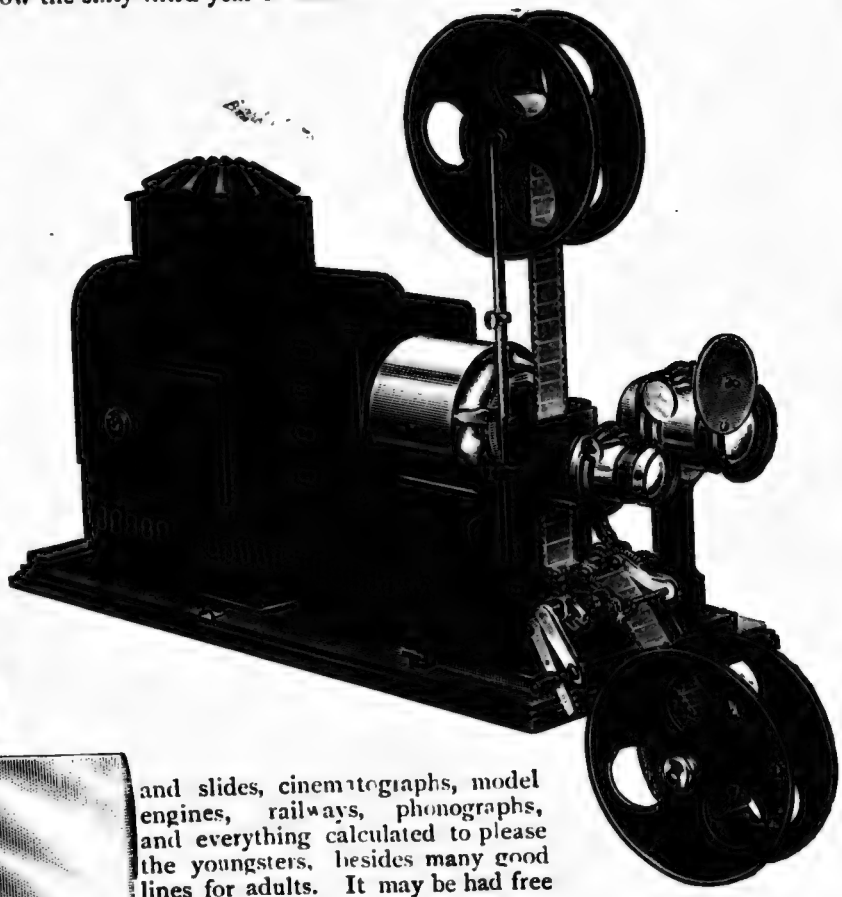
E. G. Wood, Queen Street, Cheapside.

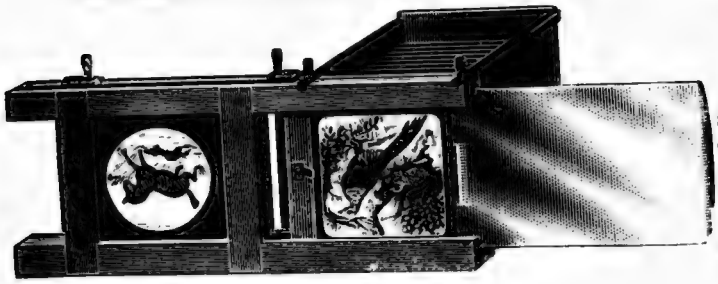
One of the greatest difficulties in the production of a list is the preparation of the index, or the arrangement of the various departments, so that the enquirer may at once find the particular goods he requires. Of complicated lists, perhaps, that of lantern slides is the most awkward to arrange in a concise and clear manner, and we were pleased to note in Wood's new catalogue that, although over 200,000 slides are enumerated, any particular subject or series can be quickly found. The slide list is divided into nineteen sections - sacred history; geography, travels, etc.; industries; technical and scientific; historical; literature; biographical; military types; naval and marine; instantaneous photos, athletics, etc., curios and whimsicalities; hymns, songs, texts; art; illustrated songs; temperance sets; moral tales for adults; moral tales for children; humorous tales; miscellaneous, comic, mechanical, and effect slides. Then, again, there is the alphabetical list, followed by the alphabetical arrangement of illustrated songs. The only fault we found in this was that part of the index had

been bound up in duplicate, an error that may only appear in the copy forwarded for review. Terms of hire, lantern exhibitions, purchase of slides, drawing-room entertainments, cinematograph displays, films, and many other departments appear in the list which is now the sixty-third year of issue.

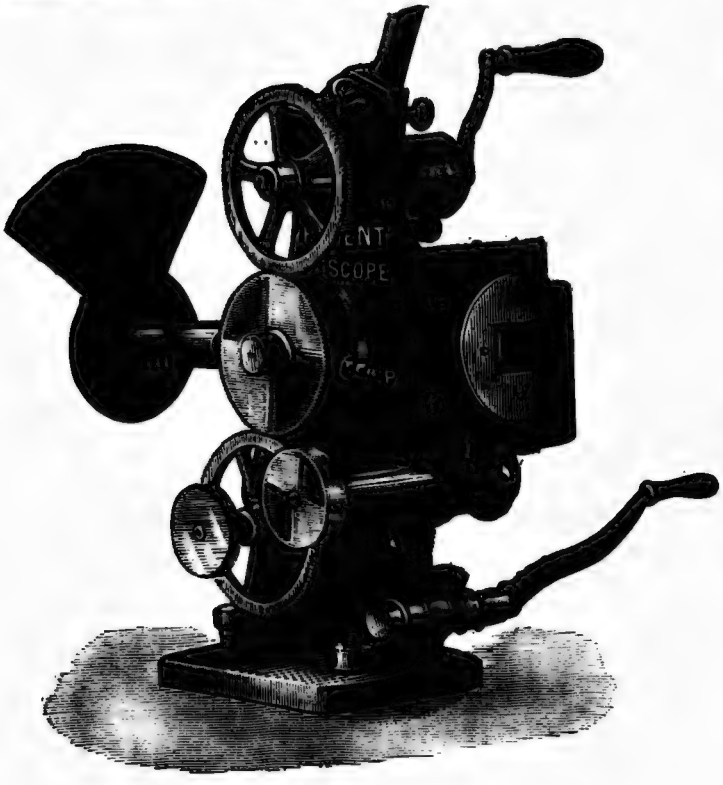
W. Butcher & Sons, Camera House,

Ever to the fore in producing novelties for photographers and lanternists, are this month making a speciality of a lantern slide carrier, called the "Primus" Automatic Registering Carrier, with self-feeding magazine. The magazine holder will carry twenty-four lantern slides, which can be automatically passed through the lantern in quick succession, each slide being accurately centred, and the previous one withdrawn to the same side as the slides are fed from, only one hand being necessary to manipulate it. This firm also show a cheap cinematograph, "The Combination," specially suitable for home use, which takes the regular Edison gauge films. It is not a toy, but a thoroughly practicable machine, well made, and capable of good service. The new Winter List, issued by Messrs. Butcher, contains a wonderful collection of seasonable novelties, including toy lanterns





and slides, cinematographs, model engines, railways, phonographs, and everything calculated to please the youngsters, besides many good lines for adults. It may be had free on application.



R. R. Beard's Perfect Bioscope.

The illustration is sufficient to show those using bioscope mechanism additional improvements. The dog bearing, usually in the frame of machine, in this instance is made in a bracket swinging from the sprocket wheel bearing; the dog bracket bearing has fixed to it two toothed sectors, one upon its face and one upon the face of the machine, which engages with the fellow-sector by the handle H. This sector has an action which moves the dog up or down as may be required; the other sector has a fellow gearing with it, swinging on the central spindle bearing, which carries the shutter bevel wheel, this sector carries pinion P geared between a pair of bevel wheels. In this case the outer wheel does not work the shutter as is usual, but transfers through pinion P to the inner bevel wheel into which the pinion of the shutter is geared. It will be seen that any movement given to the dog is also given to the shutter, as both shutter and dog must work in unison. By using this adjustment no movement of lense is required, as the film can be brought into position with the gate aperture by raising or lowering the bottom handle. No extra roller is needed for films to run over, and the top and bottom sprocket wheel spindles are both threaded, so that machine can be driven with either sprocket.

PICTURE POLITICS.

CINEMATOGRAPH SPEECHES FOR THE GENERAL ELECTION.

PARLIAMENTARY candidates of limited oratorical attainments will welcome the formation of the "Pictorial Politics Association."

By subscribing to that firm a prospective M.P. will be relieved of the necessity of addressing meetings of his constituents, an advantage that may be mutually appreciated. Instead he will merely observe from the platform, "We will now have the next picture—'Fair Trade versus Free Trade.'" And from the other end of the room a cinematograph machine will project on to a screen an animated Fiscal story in several scenes. John Bull will be observed in slumberous attitude dominated by the bad fairy of Free Trade. But there enters the good fairy of Fair Trade, who conjures up a telegraph boy. From the messenger John Bull receives a telegram which reads, "Handed in at Empire's Standpoint. To John Bull, Queer-street, W. The Unemployed problem must be solved.—Britannia." The Fair Trade fairy then manufactures a vision for John Bull's edification—the bare interior of a cottage and a starving family. This is followed by a baker's shop and the symbolic big and little loaves. Finally, the fairy of Fair Trade—whose personal charms are infinitely superior to those of her rival—vanquishes the fairy of Free Trade, and all is well with John Bull.

A capital object-lesson is realistically taught by another film depicting scenes in the life of an alien, commencing with his embarkation at Bremen and ending with his ousting of an Englishman from work.

"Wake up, John Bull," and "Back to the Land," are the subjects of other cinematograph films. Several more are in preparation for the general election. Every picture tells a story. The invention is that of Mr. Lewin Fitzshamon, and the scenes are "built up" and cinematographed in a little theatre which has been specially built at Walton-on-Thames.—*The Daily Mail.*

NEW FILMS.

No. 42.—Two Young Scamps. Length 170 feet. Price **£4 5s.**

No. 44.—Amusing Competitions In Five Scenes. Taken at an Old English Fair. Length 235 feet. Price **£5 17s. 6d.**

No. 45.—The Old Homestead, or Saved from the Workhouse. A Dramatic Story in Three Scenes. Length 240 feet. Price **£6.**

No. 46.—Carving the Christmas Turkey. Length 140 feet. Price **£3 10s.** Code Word "Turkey."

No. 47.—The Adventures of an Insurance Man. Length 215 feet. Price **£5 7s. 6d.** Code Word "Insurance."

No. 48.—The Horse Stealer, or A Casual Acquaintance. Stained realistically. Length 346 feet. Price **£8 13s.** Code Word "Stealer."

No. 49.—Peeping Tom. Length 150 feet. Price **£3 15s.**

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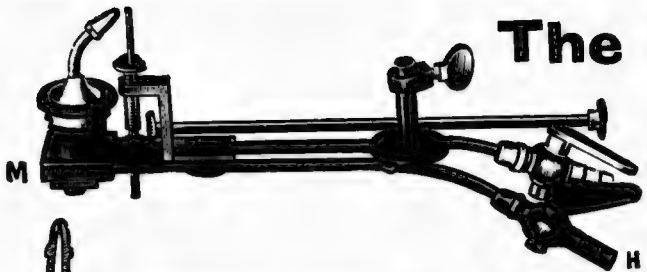

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Several seasons' experience has fully established the superiority of this jet over all others. It will yield **THE FULL 1,800 to 2,000 CANDLE-POWER** (so-called) of the ordinary mixed jet when taking its supply of coal gas direct from the town's pipe, or even from a bag *without any pressure at all.* If a town's supply is not available, it will work just as well with coal gas from a cylinder. We cannot see why ordinary jets should be purchased which cannot offer these alternatives. We have scores of testimonials from leading lanternists. *Full particulars free on application to—*

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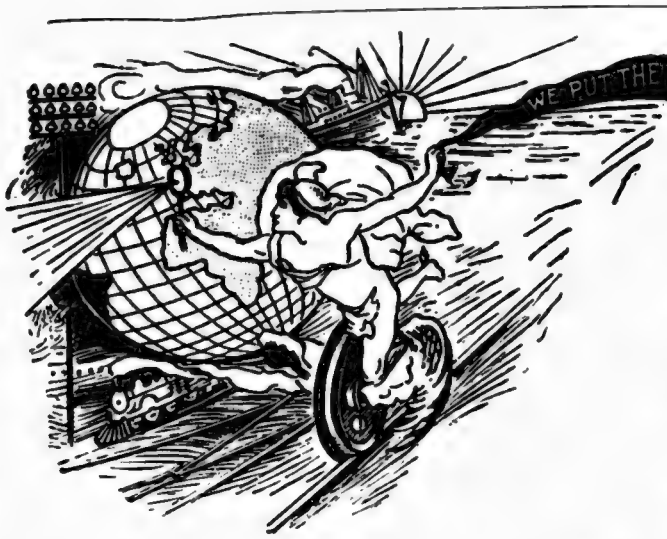

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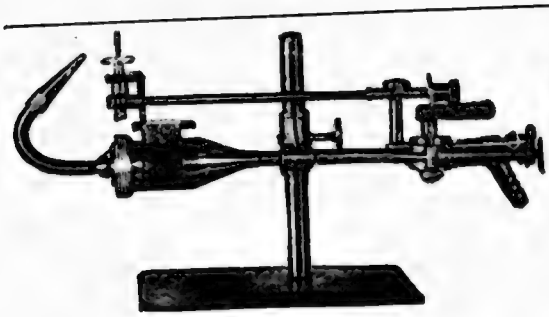

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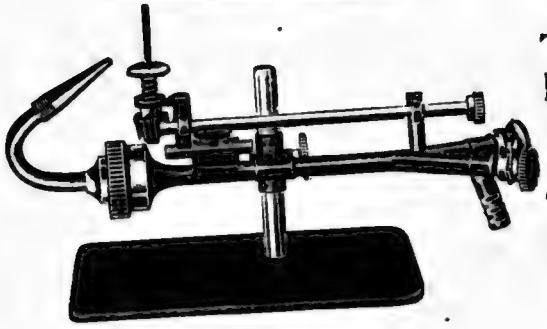

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The No. 2 Gwyer Lime-Light Jet.

The most powerful one made. For Mixed Gases or a Saturator.

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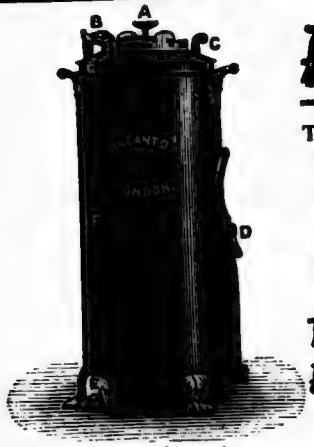

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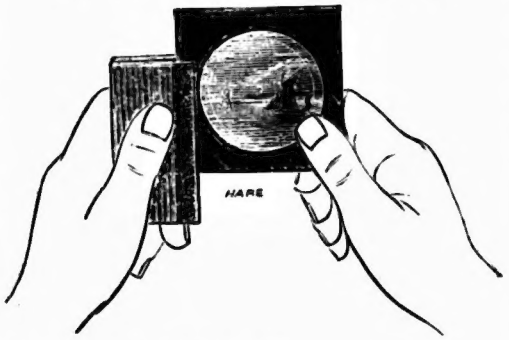

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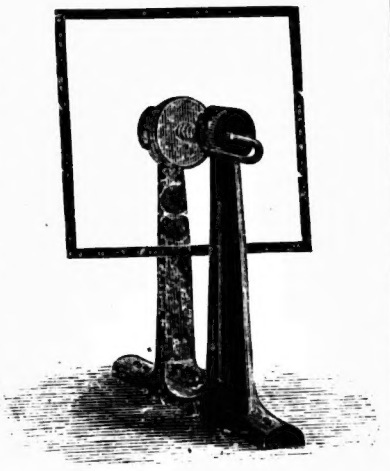

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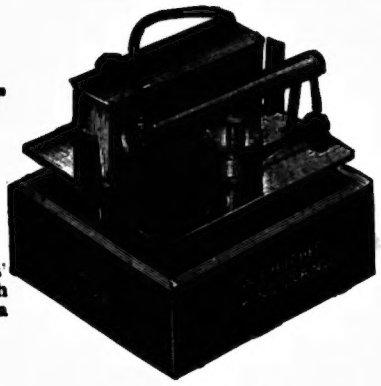

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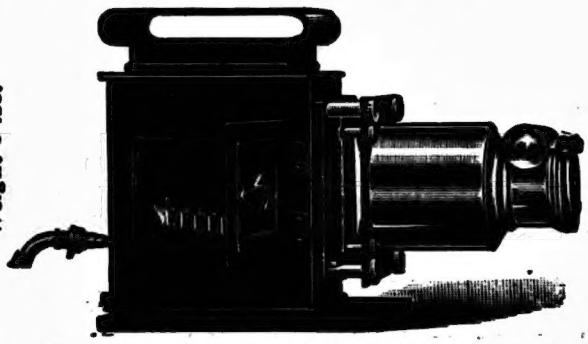

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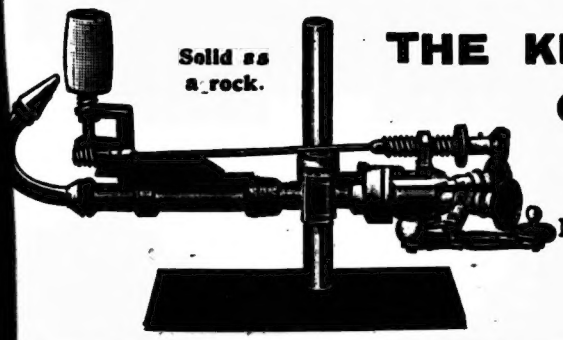

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